

Appl. No. 10/696,017

Amdt. dated July 27, 2005

Reply to Office action of Apr. 28, 2005

1-4. (canceled)

5. (currently amended) The semiconductor circuit of Claim [[1]] 10, further comprising:

a built up layer between the die and the second plurality of bumps; and

wherein the first plurality of bumps are substantially coplanar with the second plurality of bumps relative to the substrate.

6. (currently amended) The semiconductor circuit of Claim [[1]] 10, further comprising:

a built up layer between the substrate and the second plurality of bumps; and

wherein the first plurality of bumps are substantially coplanar with the second plurality of bumps relative to the semiconductor die.

7. (currently amended) The semiconductor circuit of Claim [[1]] 10, further comprising:

a first built up layer between the die and the second plurality of bumps;

a second built up layer between the substrate and the second plurality of bumps;

and

wherein the die and substrate are substantially parallel to one another.

8. (currently amended) The semiconductor circuit of Claim [[1]] 10,

wherein the substrate comprises a package type selected from the group consisting of a ball grid array, a pin grid array, and a column grid array.

9. (currently amended) The semiconductor circuit of Claim [[1]] 10,

wherein the substrate further comprises a plurality of recessed holes, each hole adapted to accept one of the first plurality of bumps.

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10. (previously presented) A semiconductor circuit comprising:
- a semiconductor die comprising a first plurality of electrical contacts and a second plurality of electrical contacts;
 - a first plurality of conductive bumps wherein at least one bump in the first plurality is conductively connected to at least one of the first plurality of electrical contacts;
 - a second plurality of conductive bumps, wherein at least one bump in the second plurality is conductively connected to at least one of the second plurality of electrical contacts; and
- wherein the average size of the first plurality of conductive bumps is at least 20% larger than the average size of the second plurality of conductive bumps.
11. (original) The semiconductor circuit of Claim 10,
- wherein the average size of the first plurality of conductive bumps is at least 100% larger than the average size of the second plurality of bumps.
12. (previously amended) The semiconductor circuit of Claim 10,
- wherein the average size of the first plurality of conductive bumps is at least 200% larger than the average size of the second plurality of bumps.
13. (canceled)
14. (original) The semiconductor circuit of Claim 10, further comprising:
- a built up layer between the die and the second plurality of bumps; and
 - wherein the first plurality of bumps are substantially coplanar with the second plurality of bumps with respect to their surfaces opposite the surface of the die.

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15. (previously presented) A method of making a semiconductor circuit, comprising:

providing a semiconductor die comprising a first plurality of electrical contacts and a second plurality of electrical contacts;

conductively connecting to the die a first plurality of conductive bumps wherein at least one bump in the first plurality is conductively connected to at least one of the first plurality of electrical contacts;

conductively connecting to the die a second plurality of conductive bumps, wherein at least one bump in the second plurality is conductively connected to at least one of the second plurality of electrical contacts; and

wherein the average size of the first plurality of conductive bumps is at least 20% larger than the average size of the second plurality of conductive bumps.

16. (canceled)

17. (original) The method of Claim 15, further comprising the step of attaching said semiconductor die to a substrate, wherein at least some of said bumps in said first plurality of bumps fit into holes in said substrate.

18. (original) The method of Claim 15, further comprising:

forming a built up layer between the die and the second plurality of bumps; and

wherein the first plurality of bumps are substantially coplanar with the second plurality of bumps relative to the substrate

19. (original) The semiconductor circuit of Claim 15, further comprising:

forming a built up layer between the substrate and the second plurality of bumps;
and

wherein the first plurality of bumps are substantially coplanar with the second plurality of bumps relative to the semiconductor die.

20. (original) The semiconductor circuit of Claim 15, further comprising:

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forming a first built up layer between the die and the second plurality of bumps;

forming a second built up layer between the substrate and the second plurality of bumps; and

wherein the die and substrate are substantially parallel to one another.

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